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Attorney Docket No.: 42P11135

Amendments to the Claims

1. (currently amended) A method of modeling a particle system composed of particles having attributes, comprising:
receiving, by a client, a definition of a particle control path from a server;
modifying, by the client, at least one attribute of a particle based on a distance between the particle and the particle control path; and
rendering the particles on a client display device.

Claim 2. (currently amended) The method of claim 1, further comprising:
receiving particle attribute information; and
generating, by the client, a set of attributes based on the particle attribute information.

Claim 3. (currently amended) The method of claim 1, wherein receiving comprises:
receiving, from the server, coordinates for a set of points that are continuously connected using a mathematical construct; and
receiving, from the server, a control algorithm corresponding to the particle control path.

Claim 4. (original) The method of claim 3, wherein the mathematical construct comprises a spline curve.

Claim 5. (original) The method of claim 4, wherein the spline curve comprises a Catmull-Rom spline curve.

Claim 6. (currently amended) The method of claim 4, wherein modifying further comprises:
determining a distance between the particle and a closest point on the particle control path; and
~~determine~~ determining an amount of change to the particle attribute based on the distance.

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Claim 7. (original) The method of claim 4, wherein the control algorithm is defined to change at least one of a position attribute, a color attribute and a size attribute of the particle during an up-date cycle.

Claim 8. (original) The method of claim 7, further comprising:
determining an occurrence of the up-date cycle according to one of a particle's age, position, color and size.

Claim 9. (original) The method of claim 6, wherein modifying further comprises:
modifying the particle attribute an amount that varies based on the distance.

Claim 10. (original) The method of claim 6, wherein the particle system is a three-dimensional particle system and the particles are defined by three-dimensional coordinates.

Claim 11. (currently amended) [[A]] An article comprising a machine-readable medium that stores machine-executable instructions for modeling a particle system composed of particles having attributes, the instructions causing a machine to:

receive, by a client, a particle control path definition, from a server;
modify, by the client, at least one attribute of a particle based on a distance between the particle and the particle control path; and
render the particles, on a client display device.

Claim 12. (currently amended) The article of claim 11, further comprising
instructions that cause the machine to:

receive particle attribute information; and
generate, by the client, a set of attributes based on the particle attribute information.

Claim 13. (currently amended) The article of claim 11, wherein receive comprises:
receive, from the server, coordinates for a set of points;

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connect each of the set of points continuously based on a mathematical construct; and receiving, from the server, a control algorithm definition corresponding to the particle control path.

Claim 14. (original) The article of claim 13, wherein the mathematical construct comprises a spline curve.

Claim 15. (original) The article of claim 14, wherein the spline curve comprises a Catmull-Rom spline curve.

Claim 16. (currently amended) The article of claim 14, wherein modifying further comprises instructions that cause the machine to:

determine a distance between the particle and a closest point on the particle control path; and

determine an amount of change to the particle attribute based on the distance.

Claim 17. (currently amended) The article of claim 14, wherein [[one]] the control algorithm is defined to change at least one of a position attribute, a color attribute and a size attribute of the particle during an up-date cycle.

Claim 18. (original) The article of claim 17, further comprising instructions that cause the machine to:

determine an occurrence of the up-date cycle according to one of a particle's age, position, color and size.

Claim 19. (original) The article of claim 16, wherein modifying further comprises instructions causing the machine to:

modify the particle attribute an amount that varies based on the distance.

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Claim 20. (original) The article of claim 16, wherein the particle system is a three-dimensional particle system and the particles are defined by three-dimensional coordinates.

Claim 21. (currently amended) An apparatus client system for modeling a particle system composed of particles having attributes, comprising:

a memory that stores executable instructions; and

a processor that executes the instructions to:

receive a particle control path definition, from a server;

modify at least one attribute of a particle based on a distance between the particle and the particle control path; and

render the particles on a display device coupled to the client system.

Claim 22. (currently amended) The apparatus client system of claim 21, wherein the processor executes instruction to:

receive particle attribute information; and

generate a set of attributes based on the particle attribute information.

Claim 23. (currently amended) The apparatus client system of claim 21, wherein receive comprises:

receive coordinates for a set of points from the server;

connect continuously each of the set of points using a mathematical construct; and

receive a control algorithm definition corresponding to the particle control path from the server.

Claim 24. (currently amended) The apparatus client system of claim 23, wherein the mathematical construct comprises a spline curve.

Claim 25. (currently amended) The apparatus client system of claim 24, wherein the spline curve comprises a Catmull-Rom spline curve.

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Claim 26. (currently amended) The ~~apparatus~~ client system of claim 25, wherein modifying further comprises instructions to be executed by the processor to ~~that cause the machine to:~~

determine a distance between the particle and a closest point on the particle control path;
and

determine an amount of change to the particle attribute based on the distance.

Claim 27. (currently amended) The ~~apparatus~~ client system of claim 24, wherein the control algorithm is defined to change at least one of a position attribute, a color attribute and a size attribute of the particle during an up-date cycle.

Claim 28. (currently amended) The ~~apparatus~~ client system of claim 27, further comprising instructions ~~that cause the machine to~~ be executed by the processor to:

determine an occurrence of the up-date cycle according to one of a particle's age, position, color and size.

Claim 29. (currently amended) The ~~apparatus~~ client system of claim 26, wherein modifying further comprises instructions to be executed by the processor to ~~that cause the machine to:~~

modify the particle attribute an amount that varies based on the distance.

Claim 30. (currently amended) The ~~apparatus~~ client system of claim 26, wherein the particle system is a three-dimensional particle system and the particles are defined by three-dimensional coordinates.